

*The Philosophy of Christianity.* By Pliny Earle Chase, LL.D., Professor of Philosophy in Haverford College.

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*Job xxviii, 12-28.*

Philosophy is "the love of wisdom."

The Philosophy of Christianity is the love of Divine Wisdom. Its corner-stone is the maxim of John: "In the beginning was the Word, and the Word was with God, and the Word was God."

The capacity and the love of investigation are both due to the fact that "there is a Spirit in man: and the inspiration of the Almighty giveth [him] understanding."

In many of our colleges there is a literary society, in which the requisite qualification for membership is distinguished scholarship. It is designated by the three cabalistic letters  $\Phi B K$ , which are the initials of the Greek words, *φιλοσοφία βίου κυβερνήτης*, "philosophy the guide of life."

The Christian philosopher, while recognizing the importance of correct guidance in matters pertaining to our present transitory life, attaches the greatest value to the life everlasting. He therefore accepts as his highest rule of faith and practice, both for time and for eternity, the saying of his Master: "this is life eternal, that they might know thee, the only true God, and Jesus Christ, whom thou has sent." Not simply that they might believe, but that they might know; that the eternal verities of life and immortality have been brought to light through a divinely appointed and divinely anointed Messenger, so that "he may run that readeth" them.

This claim may seem presumptuous to those who have been accustomed to look upon physical science as the only guide to certainty, and who have thought of religious belief as the result of education and circumstance, as something beyond our control, something for which we are in no way accountable and which is, therefore, of little comparative consequence. But the Christian, aware of the influence of belief upon character, feels that there are many things to be feared from faulty belief, while there is nothing to be feared from the clear and absolute knowledge of truth.

The Apostle to the Gentiles exhorted the brethren to "prove all things; hold fast that which is good." He did not, however, limit himself to "things seen" or to logical deductions from the temporal experience in which all men alike participate, although he showed himself to be a formidable antagonist in every arena of disputation. He saw that the search for truth may be prosecuted in two directions: first, in the direction of dependence, under a teachable spirit, waiting and seeking for enlightenment, and rewarded by the satisfaction of religious want; second, in the direction of independence or self-assertion, under a more haughty and confident spirit, forgetful of the sources as well as of the limits of knowledge, devising philosophic or scientific systems. In the field of inquiry to which he was especially devoted, he admonished the followers of that which is good to

“rejoice ever more. Pray without ceasing. In everything give thanks.  
\* \* \* Quench not the spirit. Despise not prophesyings.”

These different directions of investigation give differences of character to the results of investigation. Philosophy is not religion; neither of these important pursuits can fill the place of the other; each may, however, help the other. Philosophy is a study, religion is an instinct; philosophy is theoretical, religion is practical; philosophy is a doctrine, religion is an experience. A religious philosophy is better than a godless philosophy, because it looks at truth under more varied relations. A philosophical religion is better than a fanatical religion, because it is in harmony with all the mental faculties. But a philosophy which seeks, on the authority of a supernatural revelation, to fetter the intellectual interpretation of the physical universe, narrows the mind, while it checks the intellectual and moral progress which are important ends of religious teaching; a religion which is limited to the acceptance of philosophical inferences, may satisfy an indolent æsthetic curiosity, but it lacks the earnestness and enthusiasm of a living faith which impels its possessor to a steadfast continuance in well-doing, a faith which shrinks from no obstacle and welcomes martyrdom in preference to a surrender of its convictions.

“The fear of the Lord is the beginning of wisdom.” This truth was recognized by Auguste Comte, the advocate of so-called Positivism, when he taught that intellectual development is, first, theological; next, metaphysical; and lastly, positive. A thousand years before the Christian era, David and Solomon had taught the Jews, and Buddha had taught the Hindoos, the vital doctrine which Comte distorted and corrupted, but they were not like Comte, so foolish as to remove the corner-stone after building the superstructure. They did not believe that the science of phenomena was more positive than the knowledge of God and the knowledge of principles, or that a system, which was founded in error and which continually added error to error, could finally culminate in “positive” and unquestionable truth.

Five hundred years after those early sages had directed the attention of lovers of wisdom to the beginning of wisdom, the disciples of Zoroaster in Persia, of Confucius in China, and of Pythagoras in Greece, participated in the wide-spread reformatory movement, which accompanied the restoration of Jehovah-worship at Jerusalem and the settlement of the Old Testament canon under Ezra. They prepared the way for Socrates, who, like Pythagoras, shrank from the seeming arrogance which was involved in the title “sophist,” or wisest, and claimed to be merely a “philosophos,” or lover of wisdom. Even the sophists generally regarded theology as the highest science. Socrates, agreeing with them in this estimate, believed himself to be a special ambassador of God to the citizens of Athens, acting under the continual guidance of a *daimon*, or divine influence, which kept him from falling into error.

Another semi-millennium beheld the birth, in Bethlehem of Judea, of a teacher whose words were received, by his disciples, as coming with an

authority such as had never been known before. Claiming to be the anointed leader for whom the Jews had long been looking, representing his mission to be the fulfilment of "the law," which was "a shadow of good things to come, and not the very image of the things," he sought not to destroy aught that was good or true in previous systems. Still pointing to God as the source of all truth and all power, still finding the highest wisdom in the great truths of religion, he counted all earthly knowledge and all earthly possessions as dross in comparison with the heavenly inheritance. "For what shall it profit a man, if he shall gain the whole world, and lose his own soul?"

We thus see that in all the most highly civilized nations of antiquity the wisest men, almost without exception, believed in some means of communion between man and his Maker, and looked upon the ministers of religion as the special recipients of divine oracles. The true followers of Jesus of Nazareth have uniformly claimed that their system of religion is the highest system that has ever been promulgated, appealing both to the intrinsic excellence of its doctrines and to the results of their dissemination for evidence that their claims are well-grounded. They may, therefore, naturally regard the Philosophy of Christianity as the highest of all philosophies, and as the most profitable study to which human attention can be directed.

Christ himself, although he taught "as one that had authority, and not as the scribes," gave continual evidence of great personal modesty and humility. Although never derogating in the slightest degree, from the conscious dignity of his divine mission, he often rejected the flattering tributes with which his disciples sought to honor him, directing them to the Father whose will he came to accomplish. He did not even attempt to found a church or to frame a consistent system of doctrines during the time of his own ministry, but he left his hearers to make such application of his teachings as would best satisfy their various individual needs and promote their spiritual growth. The wisdom belonged to him; the philosophy to his disciples. His gospel, "good tidings of great joy," was the announcement of a Saviour, who should "save his people from their sins." His purpose was neither to destroy nor to change the divine methods of education, but to fulfil typical prophecies; to throw a stronger light upon the relationships of man to his Maker; to temper personal independence by a clearer sense of personal responsibility; to communicate a knowledge of the personality of God, His personal interest in His intelligent creatures, and the personal help, which He vouchsafes to all who feel a need of help and are willing to accept it. Free grace and free will; the offer of all requisite guidance; the power of choice whether the guidance shall be received or rejected; the voluntary assumption of all the risks which may attend a wrong exercise of the choice; and "the way of salvation" through him in whom "dwelleth all the fullness of the Godhead bodily;" such are some of the chief lessons of Christianity.

"Blessed are they which do hunger and thirst after righteousness: for

they shall be filled." All nature teems with the evidence of physical adaptations to physical needs. Those who are spiritually enlightened will find still stronger evidence of abundant provision for all spiritual needs. The daily bread for which we are taught to pray is indeed the "bread of life," the bread which will satisfy to the uttermost all the hungering both of body and of soul. The Father who feedeth the fowls of the air, providing for the wants which He has implanted in His humblest creatures, is not unmindful of the more important wants of the being who was made in His image, and who was endowed with "dominion over the fish of the sea, and over the fowl of the air, and over every living thing that moveth upon the earth."

All true philosophy, Christian philosophy in an especial manner, is always cautious, teachable, longing for greater knowledge and greater faith, glad even to welcome reproof when it tends to the correction of mistakes. It looks towards the infinite as well as the finite, towards the absolute as well as the relative, towards the unknowable as well as the knowable, under a conviction that even where it cannot hope for a full satisfaction of all its longings it may gain strength by wrestling with difficulties, and with the unhesitating assurance that the higher its aims the more profitable will be its victories. While modestly acknowledging the limitations which have been imposed upon it, it answers the fundamental questions,—(a) What? (b) How? (c) Why?—by asserting (a) the possibility of knowledge, (b) by means of consciousness, (c) because the Creator of man's consciousness designed it for the acquisition of truth.

Any intimation of a possibility that human power, human wisdom, or human design may be the highest power, or wisdom, or design in the universe, or any hesitation to deny such a possibility, the Christian philosopher regards as an unfortunate manifestation of ignorance. Such ignorance may be excusable in those who are honestly seeking for truth in other directions, and wherever it exists it is the part of true modesty to acknowledge it. But if the ignorant man should try to impose his ignorance upon others, as an insurmountable barrier to knowledge, or if the Christian should hesitate to affirm the absolute and undeniable truth of his answers to the three essential questions of philosophy, no pretense of modesty could shield him from the charge of blasphemous arrogance.

Every philosophical or religious system which has any claim to consideration, must have its dogmas; its positive convictions; its formulated truths or articles of belief;\* its "necessary expression in ideas, of the feelings and moral and spiritual laws and conditions which the unity and relationship of heart, conscience, will and intellect in many require should be maintained."† Such dogmas, instead of setting aside the Baconian methods, are the most obvious results of observation and experiment and legitimate logical deduction. But while dogmas are useful, dogmatism, in the sense of arrogant assertion and with a denial of any of the

\* Krauth-Fleming. *Vocab. of the Philos. Sciences.*

† H. W. Bellows.

rights of critical investigation, is unphilosophical and suicidal. The nescient or "agnostic" philosopher has the same right to approach any truth whatsoever from his side, as the Christian has from his. The discoveries of each may become greatly helpful to the other, and by joint co-operation they may both, at last, attain to a broader generality of apprehension than either could have gained alone. The Christian's start, from positive knowledge and justifiable assertion, has, however, an immense advantage over his opponent's ignorant groping in the dark and despair of satisfactory attainment.

The dogmatism of science involves greater inconsistencies and is, therefore, more unreasonable than the dogmatism of religion. The modest positivist, when he stigmatizes the popular faith as an outgrown and worthless garment, a "*caput mortuum*," is urged by a spirit of the same kind as the bigot, when he bespeaks, for any form of truth-loving research, the ban of fanatical outlawry, the "*odium theologicum*." But the modesty which doubts its own capability of attaining any higher assurance than that of sense, has no excuse for theorizing, or for claiming assent to anything which is not attested by undoubted sensible evidence. The bigoted enthusiasm, on the other hand, which rests in a blind unreasoning faith and believes that any contravention of its prejudices may be followed by endless misery, is impelled, as if by a natural instinct, to the immediate adoption of such measures as seem most likely to avert a calamity which it so greatly dreads.

Notwithstanding all the teleological consequences which are implied in the admission, probably there are few, perhaps there are none, who would be unwilling to grant that the forces, which man uses for accomplishing his limited purposes, are the same as God uses for accomplishing His unlimited purposes. The Christian philosopher finds it no less evident that the knowledge and designs of the Creator, however much they may differ in degree, do not differ in their essential characteristics from the knowledge and designs of intelligent creatures; he is, therefore, at a loss to understand the difficulties which many persons honestly avow, in recognizing the manifold evidences of an All-wise, as well as Almighty Ruler, who is always "upholding all things by the word of his power."

May not a principal source of those difficulties be found in the hesitancy of a too skeptical spirit? Doubt is very good in its proper place and within proper bounds; obvious errors should certainly be avoided; novel and startling theories should not be accepted until they have been tested by the most searching and conclusive scrutiny; it may even be well to indulge in an occasional exercise of critical acumen upon possible mistakes, which may have crept into popular creeds, either through the supposed teaching of a popular leader, or through some enigmatical and perhaps accidental inadvertence. But the detection of a petty error is of far less consequence, while it may require a much greater outlay of time and ingenuity, than the grasp of an important truth. The philosopher may safely presume that any belief, which has withstood, for ages, the attacks of cavilers, must

have some solid groundwork of truth. He can make the truth his own only by fully understanding it, but he may often find satisfaction even in a partial comprehension of doctrines which have given intellectual strength and comfort to many generations of deep thinkers. He will surely gain more wisdom by a diligent looking after truth than by a sharp and cynical search for error.

Paul's advice is well supplemented by Peter's: "But sanctify the Lord God in your hearts: and be ready always to give an answer to every man that asketh you a reason of the hope that is in you, with meekness and fear." The advantages of high ideals have been recognized in all ages. When every throb of our spiritual lives is accompanied by a feeling of God's presence, the perceptive, as well as the imaginative faculties are quickened, and our enlightened insight penetrates intuitively to reasons, both of hope and of complete assurance, which a materialistic philosophy could never find and could never understand.

All philosophy must necessarily be based upon human nature. Our love of wisdom can only extend to what we can recognize, however dimly, as manifesting wisdom; our capabilities of knowledge are limited by our capacities for knowledge.\*

The mathematical necessity which requires that all Consciousness should be manifested under the three primary relations of Motivity, Spontaneity, and Rationality, is tacitly recognized in the modern classification of mental faculties as Presentative, Representative, and Intuitive. This subjective aspect of our spiritual nature finds objective intellectual satisfaction in systems of Religion, Morals and Science.

The subjective exercise of Consciousness, in the primary relations or faculties, is manifested in Feeling, Will and Thought, which are indications of objective Need, Power, and Purpose.

Both the aim and the goal of Consciousness are subjectively developed in Faith, Desire, and Understanding, which find complete objective provision in Revelation, Sanctification, and Inspiration.

If we designate the Motive, Spontaneous and Rational forms by the symbolic letters M, S, R, these relations may all be readily grouped, as in the following synopsis:

<i>Subjective.</i>		
M.	S.	R.
R. Presentation.	Representation.	Intuition.
S. Feeling.	Will.	Thought.
M. Faith.	Desire.	Understanding.
<i>Objective.</i>		
M.	S.	R.
R. Religion.	Morals.	Science.
S. Need.	Power.	Purpose.
M. Revelation.	Sanctification.	Inspiration.

Consciousness is the surest of all things. It is, therefore, unphilosophical

\* See Trans. Soc. Phil. Amer. xii, 491-5, 498-73.

to try to trace its origin to material or unconscious substance, of which nothing can ever be known, except the qualities which Consciousness itself attributes to the supposed occasion of its own least important experiences. The conviction of material reality is, however, so strong that we should accept it as a matter of instinctive belief, and, therefore, as a truth of inspiration.\*

Since thought is stimulated directly by will, Reason is apt to believe herself independent, and to forget that all her powers, as well as all the facts and premises upon which she exercises those powers, are given by the Creator for the special uses which he designed. Scientific investigators often forget that they can reach truth only so far as it has been divinely "unveiled" or revealed, and that all error is the result of too great confidence in the unaided strength of imperfect human reason.

All the needful revelation that man has been able and willing to accept, has been offered to him, in all ages. In order that he may derive the greatest possible help from the offer it is necessary that his will should be wholly given up to the divine will. "They that wait upon the Lord shall renew their strength." This waiting should not be confined to the religious instincts. It is no less important in the training of the will and in the enlightenment of the reasoning faculties. The inspiration of "unconscious cerebration," during the quiet watches of the night, often untangles a knotty clue which has led the self-asserting mind into a labyrinth of desperate perplexity; the sanctification, which rewards the opening of the door to the Saviour who stands and knocks, always leads to a "change of heart" and often transforms the habitual character in a way that may be rightly regarded as miraculous; the inshining light of immediate revelation gives a clearness of vision and a certainty of knowledge which are known only to those who have rightly learned both to open and to use their spiritual eyes. In every case willingness must accompany ability. Help is never forced upon us; if we choose to trust solely to our own delegated strength, we are free to do so and we may often make valuable attainments in so doing, but if we wish most fully to appropriate the prophetic assurance, "the crooked shall be made straight and the rough places plain," we must feel the need of help, and be willing to seek for it where alone it is to be found.

Christian philosophy discards the use of none of our faculties; on the contrary, it is the only philosophy which insists on the right development of them all. Scientific writers often speak as if nothing should be left to faith, but everything should be decided by reason. The Christian, while committing himself to nothing that is unreasonable, places faith above reason, and sees that reason always errs when faith is discredited. The most implicit faith is always given to that which is self-evident to the believer; his faith in what he believes to be self-evident to others comes next in order and is hardly less confident. The man who should attempt, by any reasoning process, to prove what is self-evident, or even to make it plainer than it is

\* Loc. cit. pp. 495-503; 467-8; 501-34.

already, would only show himself to be one "that darkeneth counsel by words without knowledge."

All knowledge must not only begin in faith, but it must also proceed by faith, end in faith, and rest on faith. So long as our faith is weak in the full self-evidence, of our premises, of their logical connection, of the legitimacy of our reasoning faculties, or of their rightful exercise, all our inferences will be vitiated by doubt; we may reach some degree of probability, but no certainty. Of these reasonable requirements the legitimacy of our reasoning faculties underlies all the others. We can have no other reasonable assurance of that legitimacy than our conviction of the wisdom and truthfulness of the Author of our being. The highest faith is, therefore, religious faith; the highest religion is the one which offers the most satisfactory provision for all the spiritual needs of man, in all ages and under all circumstances.

None of our faculties have been made in vain. If the human race, in its infancy, was more given to theology than it is in the present day, its devotion was due to a greater sense of its needs. If the devotion led to any exaggerated development of a faith which looks to eternity, who will say that it displayed less true manhood than like exaggerations of a reason which looks only to earthly temporalities, and prides itself in "oppositions of science falsely so-called?"

True science will not only gladly accept, but it will even eagerly seek, all the help that it can get from every quarter. Assured of the perfect harmony of all truth, and of its many-sided relations, it will see that no truth can be fully understood until it has been studied in its several primary bearings on the triform intelligence of man; that the proper culture of intelligence looks to a complete and symmetrical growth instead of a monstrous, distorted, one-sided growth; that the loftiest revelations of faith yield the most soul-satisfying food for "the scientific uses of the imagination;" that the most complete sanctification of desire is attended by the greatest earnestness of purpose; that the fullest inspiration of understanding is shown by the clearest recognition and the most cheerful acknowledgment of the divine origin of the inspiration; that the dicta of all the mental faculties should be accepted, compared and reconciled, so as to give the broadest possible views of truth; that whenever inclination or avocation give the mind a special bias in one direction, special pains should be taken to learn what religious, moral or scientific acquirements are needed in order to maintain the equipoise of perfect manhood.

God's revelations in the book of nature, are as old as creation. Man, after the lapse of thousands of years, learns the alphabet, spells out a few of the simplest sentences in the record, and sets himself up in the pride of his new attainments, as the intellectual lord of the universe. He forgets that the lesson must have been set before it could be learned; that it may be learned sooner by those who are ready to listen to the Teacher, than by those who try to pick it out by themselves; and that it is never learned without the Teacher's help, although the help may be so skillfully given that the scholar is not aware of it.



The cheerful recognition of the intimate connection between religion and wisdom, was not confined to the early sages. In all historical times the wisest men have felt and acknowledged that it was their highest aim and their highest privilege to read and comprehend even the simplest thoughts of God. The boasted intellectual progress of the last three centuries is rightly credited, in large measure, to Bacon's revival and skilful unfolding of the inductive method; but the religious reformations of Wiclif and Huss and Jerome and Luther had preceded Bacon and prepared the way, through clearer expositions of heavenly truth, for a fuller understanding of worldly truths. Comte attacked theology and metaphysics, at the outset of his career, with Quixotic zeal and Quixotic blindness; but he ended by deifying humanity as a fit object for the worshiping instinct of man, and by promulgating a system of more arrogant metaphysics than ever bewildered the followers of the haughtiest Grecian sophist. The leaders of scientific thought in our own day, with few exceptions, are believers in God; many of them, perhaps a larger relative number than at any earlier period, are also devout believers in Christian revelation, and their belief is more weighty because it is not merely traditional, but springs from deliberate examination and conviction. The godless theories and ungodly lives which degrade humanity are due to the ignorance of smatterers, not to the teachings of earnest and hardworking investigators.

Christianity, more thoroughly than any previous system, teaches the essential identity of secular and sacred truth. To the Pharisees who would fain regulate all observances by their own narrow interpretations of religious doctrines, it says: "The Sabbath was made for man, and not man for the Sabbath;" to the Greeks who ignorantly worshiped the Unknown God, it says: "For in him we live, and move, and have our being;" to those who needlessly embitter their lives by over-anxious thoughts for the morrow, it shows the providence of the Father who watches over the ravens and the sparrows and the lilies and the grass of the field; to those who would set up their own pride or prejudice as a standard of merit, it says: "What God hath cleansed, that call not thou common." It invests all days, all acts, all thoughts, all pursuits with a holy dignity, so far as they may be made tributary to the highest welfare of a single individual, and inculcates full consecration in the injunction "Thou shalt love the Lord thy God with all thy heart, and with all thy soul, and with all thy strength, and with all thy mind."

While truth is one, interpretation is legion. Difference of interpretation does not necessarily imply error in any of the holders of views which may appear to be irreconcilable, unless we regard all partial truth as actual error. Imperfect beings can only gradually be brought towards perfection; in their upward growth an endless variety of shortcomings may need an endless variety of helps, and the truth which is most helpful, in consequence of the greatest number of possible unfoldings, is, for that very reason, the highest truth.

If we extend the definition of Reason so as to embrace in its province

all departments of knowledge, we may designate its three primary subdivisions as Pure Reason, Practical Reason, and Logical Reason.

Pure Reason corresponds pretty satisfactorily to Kant's *Reine Vernunft*, in so far as it is the faculty of the highest intuitions. It holds all the direct revelations of faith, all positive or *a priori* certainty, all absolute and incontrovertible knowledge. Of absolute knowledge we have examples in pure mathematics, and in every axiom or proposition which carries with itself the perception of its necessary and universal validity. From the decisions of pure reason there can be no appeal. No professed infallibility, of pope or conclave or synod or man or body of men, can shake the assurance with which we accept the decisions of self-evidence. Others may think us in error, either through want of the clear insight which we enjoy, or through misunderstanding some of the details or bearings of our decision. Whatever we know to be true, no one else can know to be false, however much he may doubt it or however absurd he may think it. The Christian philosopher ranks among the most valuable portions of his absolute knowledge the facts of his own religious experience; the certainty of spiritual being; the self-evidence of a SELF-evident source and authority for self-evidence; the necessary Being of a Planner and Lawgiver to prepare the plans and enact the laws of the universe.

Practical Reason is nearly represented by Kant's *Praktische Vernunft*. It works in the field of morality, for the formation of character; furnishing motives for the guidance of the will; fitted, under the divine sanctification of desire, for the inauguration of noble purposes; giving the real knowledge which makes by far the largest portion of our intellectual attainments. Real knowledge embraces every fact which we are compelled to believe by the constitution of our minds, but of which we do not perceive the absolute necessity. Absolute and real knowledge are often so closely united that it is difficult, especially for persons who have not been thoroughly trained in habits of nice discrimination, to tell where the absolute ends and the relative begins. For all practical purposes, the authority of a truth, which is valid under all the relations by which it is surrounded in our apprehension, is just as binding as the authority of a truth which is valid under all possible relations. Moral certainty is as much the gift of God, and therefore as obligatory, as self-evidence. Both physically and spiritually, the absolute knowledge of others may become our real knowledge, provided we are satisfied of their truthfulness. By practical reason we learn that we are surrounded on every side by limitations which we cannot overleap; that we are, to some extent, the creatures of circumstance; but that, within our bounds and under all possible circumstances there are such things as right and wrong, duty and responsibility; that we must, therefore, have so much freedom of choice and action as is necessary for the exercise of our responsibility. God has provided for the satisfaction of our needs by giving us a real knowledge of what will elevate our character, as well as by giving us an absolute knowledge of what will elevate our thoughts.

Logical, or Empirical Reason is the faculty which is commonly regarded as the crowning glory of man, by those who look upon reason and faith as mutually antagonistic. It is, however, rather an evidence of intellectual weakness than of intellectual strength; because its sole office is to unfold what is given us by pure and practical reason, and because it is exposed to all the mistakes which may arise from undue assumption of premises as well as from fallacious inferences. Kant calls it *Urtheilskraft*, the power or faculty of Judgment. It works largely in the field of science, for the classification of phenomena; examining especially the information which comes to us through the avenues of bodily sensation; confining itself, therefore, mainly to the interpretation of the material universe; and attaining, by its unaided efforts, only to problematical knowledge. Problematical knowledge covers everything which we believe to be true, but the truth of which depends on circumstances which it is impossible for us to determine with certainty. The vacillations and inconsistencies of scientific theories and systems are due, at least partly, to the attempts to disregard or discredit the testimony of the only faculties which can give us positive knowledge.

Fortunately for the interests of truth, and fortunately for science itself, such attempts are always vain. Whether we are aware of it or not, the inspirations of understanding compel us to act under the instinctive promptings of our highest faculties. We may scoff at metaphysics if we will; yet, if we study at all, we speedily find ourselves trying to explain and coördinate the physical facts which we accumulate by observation and experiment. The question, *what*, is necessarily followed by the question, *how*; fact points and leads irresistibly to theory and law. For the completion of possible knowledge the question, *how*, is naturally followed by the question, *why*; theory and law indicate such accordances of thought and will, as may be readily understood if we believe that they represent the activity of a Thinker and Willer, and such as cannot be satisfactorily explained on any other hypothesis. In order that any physical phenomena may be brought within the domain of scientific thought, we must have faith in the validity of the simple presentation, enough curious desire to keep up a proper representation, enough understanding to distinguish the general from the special and the essential from the accidental.

Religion, entrenched in the citadel of faith, has always been helped by antagonism, gaining new strength from every new struggle. Skepticism, assuming protean forms and continually shifting its ground, tries in vain to dislodge its antagonist, and at every assault furnishes new weapons to be turned against itself. The old truths, the primitive beliefs of our race, are still as precious as ever; beyond the reach of death and decay, they continue to hold forth the promise of participation in their own eternal youth and vigor, to those who will accept and rightly use them. Such acceptance and use always bring a full assurance of knowledge, which shrinks from no controversy that is worthy of notice. But skepticism is too apt to forget the two fundamental rules of controversy: that for every individual, self-evidence outweighs all other evidence; and that, whenever

self-evidence is not attainable, only qualified judges are competent to decide mooted questions.

Philosophy neither needs nor seeks any suppression of facts, and it is not fettered by any theories, however skilfully they may be framed or however haughtily they may be set forth. It grants to science the right of self-imposed limitation to the field of material phenomena, and it accepts material laws as the true keys to material facts, but it looks to moral and spiritual laws as the only keys to the facts of moral and spiritual life. It does not go to a doctor for legal advice, or to a theologian for scientific instruction; it cares little for a deaf man's judgment of a symphony of Beethoven, or for a scientific theorist's views upon a question of religious experience; but it welcomes from every quarter, from Religion, Ethics and Science alike, any new revelation of the eternal truths of God, and it always strives to reach such clear insight into the harmonies of truth as will help it to dispel the mists of human error. No truth is so insignificant that its place would be better filled by a plausible falsehood; none is so formidable that it can overthrow any other truth. The "may be" of the shrewdest conjecture, the "perhaps" of the wisest hypothesis, may be helpful to the investigator, and the philosopher will always gladly accept every well-established result to which they may lead; but they count for nothing against the "surely" of self-evidence or the "therefore" of experimental knowledge.

"A thoughtful writer," cited by Dr. Pusey in a late Oxford sermon, says: "Special studies, which bring into play any special aptitude of intelligence without paralyzing the rest, are conformable to the wants of nature. Exclusive studies, which amass a sort of conjectural life upon one point of the mind, leaving the rest in inaction, are but abnormally developing the excrescences of intellectual life; so when special science forms men who are eminent, exclusive science produces judgments which are false. Exclusive science is the only one injurious to religion, but it is also the only one opposed to it. What withholds man from faith is not the knowledge of nature which any one has, but the knowledge of religion which he has not."

The Christian philosopher would gladly share this knowledge with others, but he can point out no other way for its attainment than that of direct revelation. He is often astonished at the condescension of God; he asks, with David, "what is man, that thou art mindful of him, and the son of man, that thou visitest him?" If any satisfactory answer can be found to the question he believes that it should be sought by looking upwards, and not downwards; by following the leadings of the highest spiritual truths, and not by sounding the quagmires of material truth; by studying the records of Supreme Power and Wisdom, not by stopping short at the laws of protoplasm and chemical affinity and molecular motion.

The materialist boasts of the positive knowledge which can be attained by the senses, and regards nothing as worthy of investigation which cannot be verified by sensorial observation and experiment. The Christian

recognizes the value of the sensorium as an instrument of mind, and the reverence with which he regards his experimental religious knowledge, leads him to appreciate, at its fullest worth, experimental secular knowledge. But the worth is spiritual, not material. Beauty and order and law are spiritual attributes. The microcosm of each individual is what his spiritual discernment sees it to be, even as the macrocosm of the universe is what God saw it to be, when "he spake, and it was done; he commanded, and it stood fast," and when he "saw everything that he had made, and behold it was very good."

The deceptions of sense are proverbial. We learn, by experience, to correct such as are practically harmful, but the correction involves an exercise of judgment, an assertion of the controlling authority to which sense always is, as it was intended to be, subservient. If each of our senses may sometimes deceive us we can get no valid authority from any combination or comparison of mere sensorial findings. But if the spiritual interpretation of every finding has always a relative truth, a way is opened for supersensual knowledge. The unsoundness of any claim that such interpretations are "the evidence of the senses" may be made more glaring, by showing that sense-deception is not exceptional and rare, but normal and universal.

Take the sense of sight. The most advanced physical science of our day teaches that light and shade, color and visible form, are due solely to wave-motions in the luminiferous æther. These motions are received by an optical instrument, consisting of a combination of lenses and transparent media of various refracting powers. Whatever doubts any one may have as to the Contriver of this wonderful instrument, there can be no doubt that it was made with a specific design for a specific end or purpose; that it was designed to meet certain wants or needs of its possessor, and that its purpose is vision. There is little room for doubt that the æthereal vibrations enter the eye, and are transmitted to the brain, where Consciousness receives them, not as wave-motions, but as a beautiful and inexplicable panorama of blended ideal harmonies and contrasts. Light as we know it, and light as a material agency, are two entirely distinct realities. The spiritual power of the soul transforms the simple motions into conceptions, supplementing creative purpose by introducing a new order of things, and showing that the highest reality requires, for its continued existence, the continual exercise of intelligence.

Turn next to hearing. The unanimous verdict of the most competent judges is again in favor of motion, as the physical instrumentality of all the impressions which reach us through this important sense. The waves, however, are now in a much grosser medium, and are received by a much more sluggish apparatus. While the slowest visible light waves vibrate more than three hundred million million times in a second, the swiftest audible sound waves do not vibrate more than seventy-five thousand times in a second. The frequency of vibration is, therefore, more than four thousand million times as great in light as in sound. The atmospheric

waves strike the drum of the ear, awakening answering vibrations in the organs of the inner ear, where they are received by the delicate branching fibres of the auditory nerve and sent to the brain. There Consciousness receives them, not as waves, nor as motions of any kind, nor even as light, but as transformed, by the soul's spiritual activity, into a new order of spiritual conceptions; conceptions which have a reality of the highest degree, but a reality which exists only so long as it is upheld by the power of intelligence.

Taste and smell are more nearly alike than any other two senses, and they may be examined together. The influence of wave motion is not so evident in them as in sight and hearing, but there is no reason for doubting that the gustatory and auditory and all other nerves transmit their impressions to the brain and receive their influences from the brain, by waves or beats. Tyndall's investigations show a striking resemblance between odors and vapors in their absorption and radiation of heat; sapid substances are always soluble, and taste is not excited until some solution is made. Both these senses, therefore, require a preliminary breaking up of cohesion, and consequent increase of active elasticity. The "kinetic theory of gases," which was first proposed by Daniel Bernouilli, supposes that they are formed of material particles, animated by very rapid movements, and that the tension of elastic fluids results from the shock of their particles against the sides of the vessels which enclose them. In discussing the theory most physicists, and perhaps all, have assumed the motions of the particles to be rectilinear, but cosmical analogies indicate a probability that they may be more often elliptical, and perhaps often parabolic or hyperbolic. The likelihood of continual internal motion, of some kind or other, amounts to moral or practical certainty; the probability that taste and smell are in the same category as sight and hearing, objectively as well as subjectively, is, therefore, incalculably great, and if some skilful physiologist should announce the discovery and measurement of waves of smell and taste, the discovery would awaken great interest but little or no surprise. While awaiting the discovery we know that the throbs of the different nerves, which terminate in the mouth and nose, finally reach the brain, where Consciousness receives them, not as waves, nor as motions of any kind, nor even as light nor as sound, but as taste and smell. The spiritual wonder-worker again uses its transforming power to set forth new orders of conceptions; conceptions full of living reality, but a reality which requires the action of intelligence, both to call it into being and to maintain its existence.

The sense of touch seems so completely to underlie all the others, that they are often spoken of as modifications of touch. There are, however, some special considerations, connected with the general sensitiveness of the skin, which are worthy of notice. Many of the most important bodily sensations, at least in a physiological point of view, are dependant on temperature. One of the most interesting modern physical treatises is Tyndall's "Heat as a mode of motion." In that work, the successor of Far-

day recounts the experiments of an American-born citizen, Benjamin Thompson, commonly known as Count Rumford, together with subsequent confirmatory experiments of remarkable nicety and remarkable fruitfulness, by Joule, Mayer, Colding, and others. Those experiments all point to molecular motion as the source of heat, and their recognized importance is so great that the new science of heat, or "thermodynamics," ranks as one of the chief physical sciences. Some even go so far as to think it the only physical science, or at least the fundamental science. The genial glow of the hearth-fire may quicken the circulation; the quickened circulation may enliven the spirit; but the spiritual enlivenment and the pleasant sensation of warmth by which it is accompanied are both very different from motion, and from all other sensations. They are both realities of a higher order than any mere physical fact; realities that are only possible in and through intelligence.

The other tactile sensations as well as the renderings of the muscular sense may be referred to various degrees of resistance, dependent upon the aeriform, liquid or solid condition of the body which awakens the sensation. We have already seen that elasticity may be explained by motion, and even the most solid bodies are often highly elastic. The advocates of the atomic hypothesis commonly regard the ultimate atoms as very hard, but the mathematical requirements of the relation between heat under constant pressure and under constant volume point to great elasticity. The new chemistry, and Lockyer's late spectroscopic discoveries, also have the same ultimate pointing. They regard all the chemical elements as based on the hydrogen atom, and it has been shown\* that the elasticity of hydrogen is so simply related to the elasticity of the luminiferous æther that hydrogen may be merely condensed æther. All the particles of steel and platinum and of all other material substances are supposed to be in endless motion, through orbits of minute extent which are traversed in brief periods with great velocity. The resistance of such orbits to any change of relative position increases in proportion to the square of the velocity, so that any desired degree of rigidity might be obtained, without any actual contact of particles, by simply giving them velocity enough. The nervous action which is excited by the resistances of physical impenetrability, is transmitted to the brain, where it is received by consciousness, not as motion; not even as light, nor as sound, nor as taste, nor as smell, nor as warmth, but simply as resistance; a spiritual reality of a higher order than anything which is merely material; a reality which is made by intelligence and which is lost as soon as intelligence ceases to wield its upholding power.

We thus see that the "evidence of the senses," so far from being a correct transcript of outward realities, is always as deceptive as the seeming quiet of the seeming general flat terrestrial plane, and as the seeming daily revolution of the sun and moon and stars around our seeming centre of the universe. Our natural and irresistible conviction, that the senses report

\*Proc. Am. Phil. Soc., xii, 394; xiii, 142.

things as they are, experiences a shock when we find that there is no more resemblance between the material type and the spiritual reality, than there is between the letters of the alphabet and the ideas which they serve to convey from one intelligence to another. We then begin to see the importance of distinguishing the secondary or delegated cause, both from its immediate consequence and from the Great First Cause; we understand the shrewdness which led the scholastic wranglers to say that there is no light in the sun, no sound in a bell, no sweetness in sugar, no fragrance in a rose, no heat in fire, no cold in ice, no hardness in a diamond; the fundamental doctrine of Berkeley, as expounded by Kant, that "all phenomena are merely subjective representations in consciousness," becomes very suggestive; we learn that the universe, as we know it, could only have been made by intelligence, and that it can only be upheld by intelligence; we know that our consciousness, limited in all directions as it is, has, nevertheless, enough delegated power and authority to enable it to make, uphold, direct and govern all the subjective realities which are essential to its own welfare; we know, also, that such delegated power and authority could only have been delegated by a still higher subjective Spiritual Being.

Must we then reject all belief in objective reality? By no means. Even the apparent immobility and disk-like shape of the earth, as well as the constant daily and yearly apparent motions of the heavenly bodies, have a practical and relative truth which we are compelled to act upon and which is always helpful. We can never attain to absolute knowledge of anything which we have not made our own by subjective experience, but we have a real or practical knowledge of everything that awakens an instinctive belief in its reality. Some men will doubtless continue to argue for ages to come, as others have argued for ages past, on the one hand against the possibility of motion, on the other against the possibility of free agency. But the former will show their practical disbelief in their own theories by their own bodily changes of place; the latter, by their continual exercise of free-agency, their satisfaction when they have done right, and their remorse when they have done wrong. There is nothing so self-evident that men may not try either to refute it or to make it plainer, and mystify themselves by so doing. Arguments have been framed to prove that black is white, that one equals two, that Achilles could not overtake a tortoise, and the fallacies have been so artfully covered that many persons have tried in vain to detect them; nevertheless they have not been beguiled into accepting any of the specious sophisms, although they may have had their faith shaken in the infallibility of the reasoning faculties.

The proper co-operation of all our faculties will always lead us to such truth as God intended we should reach by their help. The difference between the lower, obscure, problematical or practical truth, and the higher, self-evident, subjective or absolute truth, is an indication of educational purpose. If we are satisfied to rest in the lower, we have no right to complain that the higher is hidden from us; if we shut our eyes to the self-evidence that is offered us in one direction, we have no right to ask for



proof in another, proof which would be necessarily sophistical if it could be plausibly framed. The man who is either blind or color blind, or who has any other bodily defect, has an imperfect instrument for the use of his spiritual ability, and the imperfection will affect all his work ; but it will not prevent his reaching the absolute and the relative knowledge which are best for him, provided he employs his ability to the best advantage. If his limitations unfit him for the reception of any truths but those of physical or natural science, let him devote himself to the labor for which he is best fitted ; but let him not scoff at other truths, and above all, let him not waste time and strength in seeking to solve, by scientific or "positive" methods, problems which can be solved only by metaphysical or by theological methods. Philosophy and religion offer to science the help which is needed in order to make knowledge complete and symmetrical. If the help is rejected, every attempt to supply its place, by means which God has not sanctioned, will surely fail.

Berkeley's teachings have greatly modified modern materialistic theories. The old idea of inertia, as the essential property of matter, and as implying complete passivity under the controlling influence of immaterial force, is nearly obsolete. Not only is force continually spoken of as material, but will is at the same time spoken of as the "highest form of force." Every writer may be allowed to define the terms which he uses, in his own way, and a complete system of science may be, undoubtedly, built upon a definition of matter as "a substance which may be either conscious or unconscious, either living or dead, either active or incapable of action, either directing or directed, either originating or originated." But there is always danger that a generalization, which embraces opposite qualities in a single conception, may lead to inadvertent reasoning in a circle and to the begging of important questions. It is well that the controlling supremacy of intelligence, upon which Berkeley insisted so strongly, should become more generally recognized, but it is not well that any needless risk should be run of assuming, in defiance of all positive proof, that anything which has once been subordinate can ever develop itself into supremacy over what has once been supreme. Even if we enlarge our ideas of matter so as to embrace all possible forms of being, we do not remove a single difficulty thereby. The same questions come crowding up before us, only under different forms. Instead of asking, "what are spirit, and soul, and mind, and will, and force," we ask, "what are consciousness, and life, and action, and government, and origination." In spite of all our attempts to reconcile the unreconcilable, the eternal facts remain, that there are spiritual phenomena in the field of consciousness and time, and physical phenomena in the field of inertia and space ; that all attempts to subordinate the former to the latter have always failed, and that the physical exists only to serve the wants and purposes of the spiritual.

It is not strange that mechanical philosophers should sometimes think that all consciousness is connected with a brain, for the highest organic mechanism that is directly and sensibly tributary to consciousness is un-

doubtedly to be found in the human brain. But the Christian sees evidences of the sway of consciousness everywhere ; in the rudimentary nervous systems of insects and molluscs ; in the busy industry of coral-building polyps ; in the shapeless jelly of the amœba ; in the development, from a single cell, of the most complicated vegetable and animal forms ; in the structure of crystals ; in the formation of compounds, with new properties, by chemical affinity ; in the continual renewals of creation during each returning year ; in the unity of plan which is manifested in the arrangement of planets and of spectral lines ; in the modifications of that plan which are displayed in vegetable growth and in stellar systems ; in all the indications of life, and law, and order, and purpose, and adaptation of means to ends with which the universe is filled. If steam engines could think, they might regard steam as the source of all the varied and intricate designs which are wrought out by machinery, with much more reason than man can give for regarding the brain as the source of consciousness.

The more mechanical consciousness becomes, either in its immediate or in its mediate manifestations, the less is the liability to mistake. The instinct of animals is more unerring than the reason of man ; crystallization and organic growth follow established design more closely than instinct ; the cell, which was meant for one part of the body, rarely goes to any other part ; machinery accomplishes its results with greater uniformity than manual labor ; the calculating machine computes difficult tables with more certainty than the most skillful mathematician. Mechanical philosophy may naturally regard mechanical perfection as the best evidence of superiority, but a higher philosophy esteems freedom more highly than automatism, and consequently finds in the possibility of imperfection, evidence of a high degree of perfection. Man, sinful as he is, and "born unto trouble as the sparks fly upward," is a nobler creature, from the very fact that he has the power to choose between right and wrong, than he would be if he were compelled always to act from unerring instincts. Now, he is capable of indefinite progress ; then, he would have been stationary ; now, virtue and merit and satisfaction in the performance of duty are within his reach ; then, he would have been a mere slave ; now, he has a distinct personality, created in the image of God, made a little lower than the angels ; then he would have been a mere machine.

Liebnitz and Coleridge and Cousin all gave great prominence to the doctrine that "Systems are true by what they affirm, but false by what they deny." "The heavens declare the glory of God ;" but "the fool hath said in his heart, there is no God." We may affirm that consciousness is connected with a brain, but if we say that all consciousness is connected with a brain, we deny the positive assertions of others and make a gratuitous assumption which is scientifically untenable. We may admit, with Hæckel, that every organic cell has a conscious "soul life ;" that in the Infusoria a single cell performs all the different functions of life ; that, *perhaps*, in the higher organisms, the numerous single cells give up their individual independence, and subordinate themselves to the "state soul" or

"personal soul," which represents the unity of will and sensation in the "cell-association;" and that his theory brings all natural phenomena into a mechanical causal connection, as parts of a great and uniform process of development. But if we deny that there is any higher soul or life or power or wisdom than is manifested in single organic cells or groups of cells, or if we deny that every "mechanical causal connection" must have a mechanic to make the causal connection, or if we deny any other theory which is more satisfactory to its upholders than our own, we overstep all scientific bounds and our words are as worthless as the babble of a child. We may accept the alternative, "natural development or supernatural creation of species," and we may explain the two hypotheses in such way as to present no necessary antagonism; but if we deny the necessity of an intelligent author for every established order and an intelligent originator for every consistent plan, we only show our own foolishness. We may believe, with Cousin, in an impersonal reason which pervades the universe like a spiritual sea or atmosphere, which is the mediate source and endless supply of all finite knowledge and all material development; but if we deny the existence of a personal reason which is still higher, our vanity leads us into arrogant blasphemy. If we open our intellectual eyes to the light of the highest philosophy, we may see that the truths of affirmation, in all philosophical systems, are partial recognitions of this higher truth which includes them all: wisdom "was set up from everlasting, from the beginning, or ever the earth was."

Modern science is too prudent to make such denials, and none of them have ever been made by men whose opinion is worthy of the slightest consideration. The methods of observation and experiment only lead to the discovery of what is; they furnish no grounds for positive assertion of any kind, beyond a simple statement of facts. But the natural disposition to theorize, which is praiseworthy when it is employed merely as a help to investigation, often leads men to attach too much importance to ingenious hypotheses, and to suppose that the explanation which they accept is the only reasonable one. Moreover, the commendable caution, which leads honest and ready investigators to publish nothing that has not been thoroughly tested by their special methods, is apt to be misunderstood. If men, whose talents, education and calling give them a peculiar aptitude for research, hesitate to affirm a mooted doctrine, their admirers often take the hesitation for a denial. The supposed denial has, for them, both the fascination of novelty and the witchery of authority; they therefore adopt it eagerly, priding themselves on their independence of thought and their superiority over the prejudices of education and tradition.

It therefore behooves every one, whose views are likely to influence others, to be very watchful lest he become instrumental in breaking down any of the barriers against immorality. If his assurance of important spiritual truths is not sufficient for him to speak with positive certainty, he should at least guard against such misinterpretations of his teachings as he is unwilling to accept, and he should claim the same rights and the same

authority for students in other fields as he claims for himself. Let his scientific reputation be as high, and his physical discoveries as brilliant as they may, he may feel himself honored by the avowal that he is a lover of wisdom, like David and Solomon and John and Paul, and by owning that their experimental knowledge of the spiritual truths, which they proclaimed, was as positive as his own experimental knowledge of the physical truths which he proclaims. He cannot show that physical truth is more important than spiritual truth, nor that the scientific writers of our day are more honest, more capable, more careful, or more thorough than the religious writers of the early Christian days. Let him not claim, then, even by the faintest shadow of implication, that the prophets and evangelists and apostles were less competent judges in their special field of experience, than he is in his, or that their assertions are less trustworthy than his own.

Büchner offers the following dilemma: "Either the laws of nature rule, or the eternal reason rules; the two would be involved in conflict every moment; the sway of the unchangeable laws of nature, a sway which we cannot call a rule, would allow of no conflicting personal interference."\* The dilemma itself is well stated, but it is difficult to see how any one who believes in "eternal reason" can accept his solution. How can laws, having "a sway which we cannot call a rule," rule anything? What are "laws" and "eternal reason?" Before we attempt to dogmatize, we should try to express our meaning so plainly that it cannot be easily misunderstood. To the Christian philosopher, the assertions that "the two would be involved in conflict every moment," that the laws of nature are unchangeable, and that their sway "would allow of no conflicting personal interference," seem like mere gratuitous assumptions.

The primitive meaning of law, as defined by Webster, is: "A rule, *particularly* an established or permanent rule, prescribed by the supreme power of a state to its subjects, for regulating their actions." Between the laws of man and the highest human reason there is rarely any conflict. No human laws are unchangeable, but the more reasonable they are the less likely are they to be changed. If they were in accordance with eternal reason what ground can any one have for thinking that "the two would be involved in conflict every moment?"

The primitive and etymological meaning of nature, is "that which is born or produced." By metonymy nature is taken to represent the producer, and Darwin defends this use of the word in language which seems to imply his undoubting belief that the producer is intelligent. Büchner says: "Nature is a single totality sustained by an internal necessity."† This definition might be interpreted to include "the eternal reason" as a part of nature, but it seems likely from the terms of his dilemma, that he agrees with most other German philosophers, in contrasting nature, as the material world, with the world of intelligence. If such is his meaning, and

\* Cited by Krauth.

† Ibid.

if he intends to assert that the material universe is sustained by an internal necessity which is independent of any supernatural influences, he is simply begging the question.

What are called "the laws of nature" are merely the generalizations of our own minds. They represent facts, of order, and harmony, and mutual relationship, which have been observed so often that we look upon them as invariable, and nearly every provision which we make for future contingencies is grounded upon our confident belief in such invariability. If we were to ask how a religious or political organization is governed, we should think it a very unsatisfactory answer to be told that "the laws of the organization rule." It is equally unsatisfactory to be told that the laws of nature rule, when we ask, what governs nature? We are not children, to be stopped in our questionings by a simple "because," or to be contented with the assurance that certain orders of fact occur because those orders of fact always occur. Yet what more do they offer us who talk of "the sway of the unchangeable laws of nature?" Who will say that protoplasm or chemical affinity rules the conscious movements of the infusoria, or the amœba, or the higher organizations which use nerves and ganglia as the instruments of consciousness.

However we may try to account for the origin of consciousness, we cannot divest ourselves of the belief that consciousness is the ruling power of its own polity. Even if we can bring ourselves to think that the "cell-soul" is the product of the material forces which organized the cell, we cannot help thinking that, after it is "developed," it rules the cell; even if we define matter so as to include all phenomena, the only ruling force that is self-evident is the force of will. Seeing an established or permanent rule in the material universe, which resembles the "established or permanent rule prescribed by the supreme power of a state to its subjects," we reason from analogy and call the natural rule, as well as the human rule, a law. Extending the analogy, we look upon the "laws of nature" as rules prescribed by the supreme power of nature. The Christian philosopher extends the analogy still further, and finds that all his questionings are satisfactorily answered by a simple acceptance of the revelation, that the supreme power is an Omnipresent, Almighty, "Eternal Reason," and Will, and Love. According to the only intelligible conception which he is able to frame, of the laws of nature and the eternal reason, we have no grounds for saying that "the two would be involved in conflict every moment." On the contrary, any conflict is an absolute impossibility. "The sway of the unchangeable laws of nature, a sway which we cannot call a rule," continues only so long as God wills; the laws are unchangeable only while their Author does not wish to change them; there can be no such thing as "conflicting personal interference," because at the moment when there would be an interference, provided the laws had an independent existence, the change in the Divine Will makes a corresponding change in the laws.

In this conception all the terms are used in their simplest, most obvious, and most general acceptation. If the teachers of a different doctrine have

a well defined notion of the laws of nature, which enables them to give up the idea of an intelligent Ruler, it would be much better that they should express the notion by some other term than law, and they should by all means give such clear definitions as will enlighten the understanding of their readers. If they have no such notion, they use "words without knowledge." The use may be honest, and free from intention to deceive, for every one is liable to an inconsiderate employment of terms which have been familiar from childhood. But a professed searcher for truth, who believes that the majority of thinking men have, for ages, been blinded by error, can hardly be excused for forcing their expressions into a meaning which they would unanimously repudiate. Such a course may lead to one of those endless wars of words which constitute a large portion of the fancied oppositions between science and religion, but they hinder, instead of helping, the spread of knowledge. When science claims the right of free discussion, the right must be granted, but only in legitimate ways. The etymological bond between *veror* and *res*, *reason* and *real*, *think* and *thing*, is only one out of many indications that philosophy is only concerned and can only deal with ideas; that the ideal is, as Plato taught, the only reality to which we can possibly attain; that all manifestation, material as well as spiritual, is only the expression of ideas; and that nothing can be gained by trying to banish or ignore the highest ideas which have been revealed to men and to shut them within the narrow bounds of manifestation, of which we can know nothing except through subordinate ideas.

The highest philosophy, while it seeks for nothing but the truth, will be satisfied with nothing short of the whole truth; truth to the whole triplicity of human nature; truth which can harmoniously promote all the purposes of revelation, sanctification and inspiration.

A strong feeling of spiritual need, with the implicit dependence upon the intimations of faith which is its natural accompaniment, gives philosophy a leaning towards mysticism; the happiness, which accompanies every satisfaction of the need, awakening a thankfulness to the Giver of all good and a recognition of His benevolence which lead to theories of *optimism*. An energetic, self-asserting will, with an accompanying disposition to yield to every impulse of desire, gives a tendency towards dogmatism; the abuses of freedom, which characterize "the natural man," giving belief a subjective bias which is shown in systems of *pessimism*. Active reasoning powers, leading to a continual exercise of thought upon speculative questions, give rise to skepticism; the impossibility of reaching any conclusion, in which something is not taken for granted, convicting finite reason of inherent weakness, throwing a shade of doubt over every commonly accepted belief, and tending towards *nihilism*, or a denial of all reality. Christianity assigns each group of theories its proper limits, by teaching that "God is good;" the human "heart is deceitful above all things, and desperately wicked;" "the natural man receiveth not the things of the Spirit of God, for they are foolishness unto him; neither can he know them, because they are spiritually discerned." There is no inconsistency in believing: 1, that

the created universe is the best possible, when considered with due regard to all the purposes of creation ; 2, that our world is the worst possible, in view of the evil which has resulted from the intentional interference of human liberty ; 3, that no certainty can be reached by a reason which starts with the assumption of its own independence, and refuses the guidance which is offered by its Creator.

Aristotle says, "philosophy began in wonder."\* Wonder leads naturally to admiration, admiration to investigation. Through wonder we learn, and the facts which we thus acquire constitute the largest, as well as the most important portion of our knowledge. Through admiration we become attentive, attention giving distinctness and thoroughness to knowledge. Through investigation we unfold the truths which we have already ascertained, and although we are not directly led to new truths, we discover new relations, which may excite new wonder and admiration, thus leading indirectly to the knowledge of new facts. Wonder, admiration and investigation all aim at the highest conceivable ends. Each of them finds special ends of its own, which are so important that they are sometimes looked upon as all-embracing. But the partial can never be so comprehensive as the general ; the satisfaction of one want is inferior to the satisfaction of all. The fondness for study and investigation is implanted in us for the formation of character, and no better test can be given, of the importance of any belief or pursuit, than the influence which it is likely to exert, either in elevating or in degrading the soul. The order in which the fundamental questions of philosophy naturally arise, tends to lead the mind from effect to cause, and from cause to final cause or purpose ; from creation to creative power, from creative power to creative design ; from manifestation, and power, and purpose to the Source of all things, the only true God, who is at once Upholder, Creator and Designer. Physical science very properly recognizes the fact that the investigation of final causes and of other metaphysical problems is out of its province, but for that very reason it should not reject the help which theology and philosophy are always ready to give it.

There is no field of natural science which is not full of pointings, backward to the unconscious, and forward to the conscious. Matter is manifested in various forms which are known as chemical elements ; elements combine to make compounds of various properties ; both elements and compounds often occur in crystalline forms, each crystal being built upon a definite plan ; through the mystery of life inorganic matter becomes organic, the simplest manifestations of organizing force transforming the mineral into the vegetable, and higher manifestations making vegetable life tributary to animal life ; both in the vegetable kingdom and in the animal kingdom there are many gradations, from lower to higher species and genera and orders and classes ; the visible creation culminates in man, who boasts his pre-eminence mainly on the ground of his superiority in intelligence.

Throughout this ascending scale of being, in which, at every step there

\*Cited by Krauth.

is something added to the step below, there are unmistakable evidences of a unity of design, such as would result from a unity of Supreme Intelligence. The likeness of finite intelligence to Infinite Intelligence, is shown both by the power of partially comprehending the designs of the Creator and by the power of scientific anticipation, which sometimes leads to important scientific discoveries.

Evolution, development, execution of purpose, are facts of every day experience. Religion, Morality and Science are all called to deal with them, each according to its own methods. Science, of its own choice, has taken the mechanical method, which is the lowest of all, although it may be as important as any, provided it is employed in the proper spirit. All the details of evolution and development, which can be discovered by the most untiring search, are portions of God's truth, and we owe many thanks to the earnest, hard-working men through whose diligence they are made known to us. But evolution as a fact or law expressing a Divine method, is one thing; evolution as a self-sufficient theory, is quite another thing. The fact must be accepted, just so far as it is shown to be a fact, and no further; the theory is only a child's answer to questions of the highest import.

The engineer, deeply interested in the workings of an intricate machine, may study it in all its parts, watching the bearing of every joint, and lever, and cog, and band upon the result which the whole combination was intended to bring about, and admiring the simplicity of contrivance which, by avoiding all superfluity, displays the inventor's wondrous skill. His own knowledge may be enlarged by the study, and he may find himself greatly helped by it in subsequent important professional undertakings. But what should we think of his scientific wisdom, if he should try to enlighten us in regard to the origin of the machine, by telling us that the atom-souls give up their individual independence and subordinate themselves to the molecular-souls; that the molecular-souls, in their turn, subordinate themselves to the joint- and lever- and cog- and band-souls; that the joint- and lever- and cog- and band-souls subordinate themselves to the machine-soul; that all the lower forms of consciousness thus become tributary to the higher consciousness of the machine's state-soul or personal soul, which represents the unity of will and purpose in the atom-association; and that thus all the phenomena of the machine are brought into a mechanical causal connection as parts of a great and uniform process of development? If we study the mechanism of the eye and ear, and the contrivance by which they are fitted for their intended purposes, can we show any greater wisdom by suggesting a similar explanation as final and sufficient? Religion, Morality and Science may all be satisfied by accepting the teaching of David and Solomon, and in no other way: "He that planted the ear, shall he not hear? He that formed the eye, shall he not see?" "The hearing ear, and the seeing eye, the Lord hath made even both of them."

There can be no question that a too great and exclusive absorption in the study of outward nature, will lead us towards materialism, and that materialism will tend to dwarf our spiritual growth. There is little risk,



while physical research continues so rife as it now is, of our becoming too spiritual; consequently there is little risk in the spread of spiritual instruction, as an antidote to the philosophy which ignores all spiritual control. These grand maxims should be indelibly impressed on every mind, and above all on the minds of physical investigators; that "we have a higher warrant for believing in God than for believing in any other truth whatever;"\* that the simplest exercise of thought proves the existence of spirit, while the existence of matter "as a distinct entity has never been proved, and is seriously questioned;"† and that, even after we have granted the reality of an inert, unknowing somewhat, which underlies material phenomena, we should still look to the wisdom which sways, as higher than the ignorance which is swayed.

Our age is often called an age of materialism, but when we compare it with previous ages we may find much to be said in its favor, while the faults, with which it is justly chargeable, lie partly at the doors of Christian believers who have neglected their religious duties. Most investigators, in every age, limit their researches to fields in which there is the greatest likelihood of discovery, and in which general interest may be most readily awakened by direct appeals to the senses. This is in accordance with evident Creative Design, for the senses are the only known avenues of intercourse between the spirit of man and the material universe, and the beginnings of education come through such intercourse. The great end of education is, however, spiritual, and if our spiritual teachers do not keep pace with the age, we must all suffer loss. We need, therefore, educated guides, as well as educated followers; a body of apostles, prophets, evangelists, pastors and teachers,‡ capable of understanding and rightly qualified for interpreting and reconciling, the truths which skillful decipherers have drawn from the Bible of creation, as well as those kindred truths of kindred revelation in the Bible of Scripture, and in the Bible of the soul.

Although timidity has hitherto greatly blocked the way against such interpretation, we have reason for congratulation in the unconscious shaping of physical theories by spiritual intuitions. Newton, near the close of his *Principia*, says: "This most beautiful system of the sun, planets, and comets, could only proceed from the counsel and dominion of an intelligent and powerful Being;" and in his third letter to Bentley: "It is inconceivable that inanimate brute matter, should, without the mediation of something else which is not material, operate upon and affect other matter without mutual contact;" La Place supposed the velocity of gravitating action to be instantaneous, a velocity which is impossible save through a spiritual medium; Tyndall, in speaking of the "potency" of matter, expressly admits that he does not seek to degrade spirit, but to elevate matter, and in his Manchester lecture he indignantly disclaims "that creed of atheism which has been so lightly attributed to him;" Huxley avows himself a spiritualist, rather than a materialist; Maudesley regards will, as the highest

\* Ex-President Thomas Hill.

† Rowland G. Hazzard.

‡ Eph. iv, 11.

form of force ; Maxwell says that the progress of science has "tended to deepen the distinction between the visible part, which perishes before our eyes, and that which we are ourselves, and to show that this personality, with respect to its nature as well as to its destiny, lies quite beyond the range of science ;" Barker, in his address before the chemical section of the American Association, quotes the definition of matter, as "that which is essential to the existence of the known forms of energy, without which, therefore, there could be no transformations of energy ;"\* Cope, in discussing the origin of the will, speaks of "the goodness of God as the anchor of the universe ;" Draper, addressing the Chemical Society, says : "Shall a man, who stands forth to vindicate the majesty of such laws, be blamable in your sight? Rather shall you not, with him, be overwhelmed with a conception so stupendous? And yet let us not forget that these eternal laws of nature, are only the passing thoughts of God ;"† Frothingham, in the very extremity of his radicalism, makes the following acknowledgments : "Still, that whatever power there is, is alive, in every atom of space, in every instant of time, is put beyond controversy, and manifest, let us add, in a much higher form in mind than in visible matter." "It is impossible for me not to believe that the universe is governed by an intelligent will."

Berkeley himself could hardly have found fault with any of these statements ; he would have felt little fear of any materialism which defines matter in terms that would be equally applicable to spirit. Quotations might be indefinitely multiplied, to show that the best devotees of modern science, while they fearlessly assert their right to vindicate the truth of their own discoveries and to accept every inference which may be legitimately drawn from them, admit, in their best moments, that there is a realm beyond the reach of their physical analyses and experiments. In that realm it is the right of religion and morality to work, and by faithful work they may check all tendencies of science which are one-sided or otherwise dangerous. Whoever has a knowledge of spiritual truth, which is as sure as that of John and Paul, may look for a success akin to theirs ; whoever presents the results of his religious experience, as clearly and forcibly as Tyndall and Darwin and Huxley present the results of their physical experience, will find that faith and reason, going hand in hand, become mutual helpmeets.

Christian philosophy says to its upholders : Yours might have been, much more largely than it is, the credit of that growing recognition of spiritual power which makes the defenders of truth so hopeful ; it is not yet too late for you to resume the armor of your early leaders and renew their career of conquest. Be not afraid to acknowledge the ignorance which you cannot conceal, be bold in asserting the truth of what you know, and science, forgetful of her apparent hostility, will gladly shake hands with you, sitting at your feet as an eager learner of truths which round and supplement her own discoveries.

\* Stewart and Tall.

† "The laws of nature are the thoughts of God."—Oersted.

The most thorough-going evolutionists are the fullest believers in the modifying influences of struggle, want, annoyance ; all of which are evidences, more or less striking, of an indwelling consciousness which promotes development. The amount of variation which man has assisted in producing, in pigeons, cattle, and other domesticated animals, is often quoted in order to show that neither specific nor generic differences are sufficient to need any unwonted intervention of creative power for their production. In geology and astronomy there are like tendencies to avoid cataclysmic hypotheses, and to seek an explanation of past changes in the earth and in the heavens through such mediate causes as are still at work. These tendencies are not objectionable unless they lead us to forget that the creation of a new cell calls for an exercise of supernatural power as truly as the creation of a universe ; that the miracle of every moment is as wonderful as the miracle of developing order out of chaos ; that the Upholder of all things is also the Maker of all things ; that any relaxation of his mighty energy would be followed by instant and universal confusion. If we keep all these things in mind, our sense of the continual presence of God will lend a solemnity to all our undertakings which will incline us to trust in him as our all-sufficient help and shield.

“In discussing the material combinations which result in the formation of the body and the brain of man, it is impossible to avoid taking sidelong glances at the phenomena of consciousness and thought. . . . Though the progress and development of science may seem to be unlimited, there is a region beyond her reach, a line with which she does not even tend to osculate. Given the masses and distances of the planets, we can infer the perturbations consequent on their mutual attractions. Given the nature of a disturbance in water, air, or æther, we can infer from the properties of the medium how its particles will be affected. In all this we deal with physical laws, and the mind runs freely along the line which connects the phenomena from beginning to end. But whenever we endeavor to pass, by a similar process, from the region of physics to that of thought, we meet a problem not only beyond our present powers, but transcending any conceivable expansion of the powers we now possess. We may think over the subject again and again, but it eludes all intellectual presentation. The origin of the material universe is equally inscrutable.”\*

Thus physical research, which starts from faith, and proceeds by faith, ends by sending us back to faith ; “the substance of things hoped for, the evidence of things not seen ;” for the answer to all our inquiries about the highest realities. Our confidence in the results which have been reached through faith in the phenomena of the lower field, should give us still greater confidence in the phenomena of the higher. The evidence of abundant provision for all the wants of our material nature furnishes a well-grounded assurance that an equally satisfactory provision has been made for all the wants of our spiritual nature.

No doctrine can ever gain extended acceptance, unless it is based upon

\* Tyndall, “Heat as a Mode of Motion 4th ed., § 723.”

some evident phase of truth. However desirable general knowledge may be, it is attainable only through the accumulation, repetition, and complete mastery of specific facts, by means of definite practical lessons. This is especially true in the case of religion. Drop everything that is or has been denominational, and you will have little left save a vague philosophical abstraction, in which most men may agree, but in which few can find any satisfaction. The "absolute" of the metaphysician; the "supreme" of the scientist; the "all" of the pantheist; represent conceptions towards which the mind is irresistibly driven, but at which all meaning is lost. That which is void of relation, cannot be made the object of thought by beings who think only under relations.

As soon as we admit relativity and attribution, we see that God would cease to be Almighty if He had not the power to reveal himself, in relations of love and sympathy and help, to his intelligent creatures in whom he has himself implanted a wish for love and sympathy and help. Hence arises the metaphysical conception of an "absolute-relative," which accords with the Biblical revelation of an All-wise, Almighty and Ever-living God, who is "not a God afar off," but always and every where near at hand. Under a vague perception of the manifold ties which may subsist between man and his Maker, systems of polytheism arise, of which the most philosophical forms are found in the trinities of the Hindoos and Egyptians. The hidden truth, which they represent, rests upon the mathematical necessity that a relative spiritual nature, like that of man, must be triform; either affected, self-influencing, or affecting; either emotional, voluntary or intellectual.

The revealed doctrine, "God said, Let us make man in our own image, after our likeness," is thus in perfect harmony with the highest philosophical inference of natural religion, and with the "catholic faith" of the Athanasian creed, which worships "one God in Trinity and trinity in unity, neither confounding the persons nor dividing the substance." The conception of the dogma, in the old mythologies, was dim, ill-defined, and generally tritheistic; its deep spiritual meaning was set forth in the Jehovah, Adon, and Ruach, of the Hebrews, the Father, Son, and Holy Ghost, of the Christians.

Religion, as well as science, should always be practical, progressive and aggressive in the adaptation of its unchanging principles to the changing requirements of human progress. Truth is so impregnable that it should court criticism, rather than shun it; our interpretations of truth may be vacillating, but if they are, we cannot give them stability by refusing to examine them. Religion has nothing to fear, save from its own fearfulness; nothing to hope, save in such hopefulness as springs from its own everlasting ground work of truth. Science, resting on reason, asserts its claims with a boldness which almost disarms opposition and carries nearly everything before it; Religion, resting on faith, timidly clings to its traditions, but shrinks from the inevitable contest which is to give them new life.

Our children, with all the natural curiosity of youth, fascinated by the wonderful rapidity of discovery and the charms of novelty, may easily be led to confound hypotheses with facts, unless we provide some means for their proper enlightenment. They may also be easily led to see that all truth is harmonious; that there are different kinds of truth, adapted to different spiritual requirements; that the existence, the appreciation, and the authority of truth, are all due to spiritual existence; that spirit is superior to matter; that only through faith in the inspiration of the Almighty is any exercise of our reasoning powers or any attainment of knowledge possible; that faith is, therefore, higher than reason, and it is important that our faith should have the foundation of God, which standeth sure.

Let us not hope or desire to banish either bigotry or radicalism. As long as men differ in taste and ability, they will also differ in their leanings towards opposite extremes of thought. Men of one idea fill a useful place in the economy of culture, for their very extravagance may serve as a warning; their devotion, as an example; their leadership, as an inspiration; their antagonism, as a needful restraint. Few walk so safely in the golden mean, that they are never misled by the mists of error; few can be awakened to a knowledge of their own mistakes, so quickly and so thoroughly, as by wrestling with counter mistakes. He who seeks for a symmetrical growth in truth, should first seek to know himself. If his intellectual vigor is so great as to make him haughty and headstrong, he needs to learn the helplessness of reason and the power of faith; to see that all our boasted intellectual triumphs are limited to the acceptance of conclusions, which rest upon simple faith in propositions that cannot be proved. If his faith in his creed, his teachers or his companions, degenerates into the credulity of ignorance, he needs to learn that faith was given us only as a helper, not as a tyrant; that moral and religious growth should be accompanied by intellectual growth; that worldly probation was designed for the proper exercise and training of all our powers, in order that we may come "unto the measure of the stature of the fulness of Christ;" that a reasonable faith should always be accompanied by a faithful reason.

It is with nations and with ages as with individuals. Each community and each period, represents a certain stage of progress, a certain capacity of development, a certain want of guidance. Although history often seems to repeat itself, each apparent repetition is shaped by new conditions. Old questions are continually coming up, but they are continually answered under new phases of experience. The thoughts of Socrates and Plato have left an impress upon humanity which can never be obliterated; the great religions of antiquity prepared the way for Christianity; the claims of Christianity, as a final and culminating revelation "in the dispensation of the fulness of times," rest on its completeness and on its adaptation to the wants, not of a single age or of many ages, but of all ages. The triumphs of reason, when guided by faith in the intimations of truth which

are given, with more or less clearness, to all men, are shown in the lasting vitality which pervaded the teachings of the great questioner and the "academic swan;" the triumphs of faith, when moulded by the sturdy intellects of skilful priests and devotees, maintained the old religions during their severally allotted reigns; the joint triumphs of reason and faith, under "the shining light, that shineth more and more unto the perfect day," are henceforth to be won by Christian champions, through such diligence of labor and harmony of action, as will promote a thoroughly symmetric spiritual and intellectual growth.

Christianity, as thus interpreted, becomes the culmination of all philosophy, as well as the culmination of all religion, for any system of complete truth must satisfy all the demands of secular investigation, as well as all the needs of eternal warfare. Few, perhaps none, are fully aware of the mighty influence which the Christian training of nineteen centuries has exerted on the habits of thought, and on the mental calibre, of every individual in modern civilized communities. Scoffers, wearied with the inconsistencies which mar the characters of professed religionists, and dazed by the enchantment which is lent by distance, sometimes extol the purity of heathen faiths, or the superiority of philosophical systems to all forms of faith. But impartial observers find in the Bible, as nowhere else, an embodiment of the best truths of all ages, expressed with a grand simplicity which is without parallel, and suitable for a ready application to all wants.

There will always be a large intellectual class, acknowledging an Omnipresent Ruler who is All-loving, Almighty and All-wise, whom they delight to worship as their Heavenly Father, but of whom, through fear of "dividing the substance," they hesitate to speak in terms which might be interpreted as claiming a knowledge of mysteries that are beyond their comprehension. There will always be a much larger class, so filled with a sense of their own weakness and unworthiness, that they yearn after a still closer and, as it were, brotherly relationship of sympathy and suffering, under which they may be emboldened to approach the throne of grace with the prayer of David: "Let the words of my mouth, and the meditation of my heart, be acceptable in thy sight, O Lord, my strength and my redeemer." There will always be a third class, rejoicing in the belief that God is a Spirit, who is to be worshiped in spirit and in truth, who offers them at all times the spiritual guidance which is best suited to their immediate spiritual condition, and who will require nothing at their hands but a simple, childlike acceptance of that guidance and consequent obedience to their clearly perceived intimations of truth and duty. Each of these views is a relative and partial view. In each class there will always be many who think, that even if it should be true that partial truths may answer all the positive requirements, the bare necessities of our nature, such harmonious development of our faculties as is most desirable, can only be attained through the study and acceptance of all the primary phases of belief, and the search for the fundamental postulates which unite them all and give them all their vitality.

Faith cannot take the place of action or of reason ; action cannot take the place of faith or of reason ; reason cannot take the place of faith or of action. The province of faith is, however, the highest, because it deals directly with eternal verities, and because it furnishes the sole authority for action and reason ; the province of action is next in order of dignity, because it determines character ; the province of reason is the lowest, because it deals mostly with temporal and worldly relations, and because it indicates a defective intelligence, which can only slowly and laboriously reach a clear understanding of the contents of simple intuitions.

None of the facts, either of theology or of metaphysics or of physics, can be gainsaid. Some of them are naturally, and some are spiritually discerned. They may all be known, because God has revealed himself, not only as Power and as Way, but also as Wisdom and Love, as Truth and Life. In the coincident union of perfect humanity and perfect wisdom is found the Divine image, in which man was made and by which we are able to have the positive assurance, of full and indisputable self-evidence, in regard to all things which God has been pleased to reveal to us and which we are willing to accept. Theories have no binding authority upon any one, and they have no value except as they may be made tributary to the discovery or to the application of new truths or new harmonies. Theologians, metaphysicians and physicists should all be mindful of the behest, "*ne sutor ultra crepidam*;" they should also remember that the best interpretation of any truth is the one which accords most fully with all other truths. The highest philosophy is that which is best fitted for the highest capabilities of immortal intelligence. The surest foundation for philosophy is the one on which Christianity is built, the Rock of Ages, the Eternal Word and Wisdom of God.

*Stated Meeting, January 3, 1879.*

Present, 5 members.

Vice-President, Mr. FRALEY, in the Chair.

A letter requesting exchanges of Proceedings, was received from Mr. P. Casamajor, Corresponding Secretary American Chemical Society, No. 11 East Fourteenth street, New York City, dated January 1, 1879. On motion the name of that Society was ordered to be placed on the list of correspondents to receive the Proceedings.

A letter requesting exchanges was received from Prof. Carus, editor of the *Zoologischer Anzeiger*, through Mr. E. L. Mark, Instructor in Zoology in Harvard University, dated 48 Shephard street, Cambridge, Mass., December 23,